AMENDMENTS TO THE CLAIMS

Please amend the claims as follows without prejudice to future prosecution, without disclaimer of any subject matter, and without presumption that the actions are taken for any reason related to patentability:

- 1. (Currently amended) An isolated, soluble, non-fibrillar amyloid β oligomeric structure comprising from about 13 to about 24 amyloid β 1-42 proteins wherein the structure exhibits neurotoxic activity and free of amyloid β 1-40 protein.
- 2. (Currently amended) An isolated, oligomeric structure according to claim 1 wherein the said oligomeric structure comprises 16-mer, 20-mer, or 24-mer aggregates of amyloid β proteins.
- 3. (Currently amended) An isolated oligomeric structure according to claim 1 wherein the said oligomeric structure has a molecular weight of from about 36 kD to about 108 kD as determined by non-denaturing gel electrophoresis.

4.-10. (Previously cancelled)

11. (Currently amended) An isolated oligomeric structure according to claim 1 wherein the said oligomeric structure comprises globules of dimensions of from about 6.5 nm to about 11.0 nm as measured by atomic force microscopy.

12.-44. (Previously cancelled)

45. (Previously presented) The oligomeric structure according to claim 1 wherein the structure does not contain an exogenously added crosslinking agent.

46. (Cancelled) The oligomeric structure according to claim 1, wherein the structure is neurotoxic.